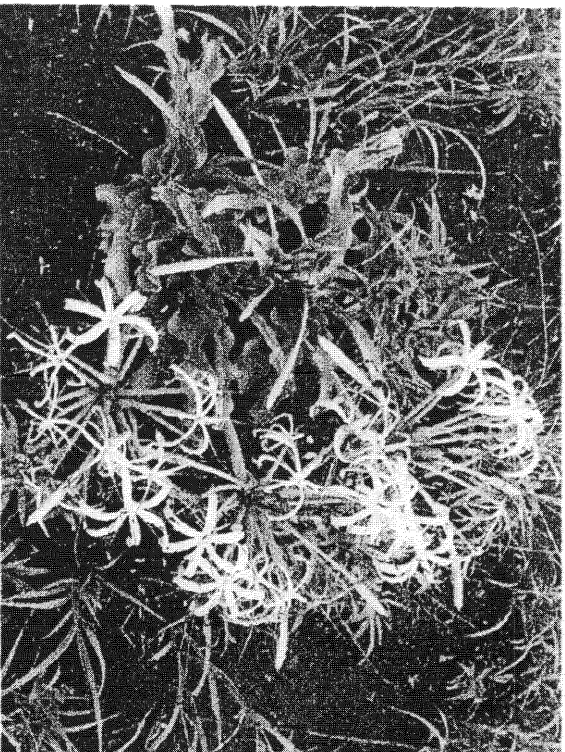


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PHASE 1

ARCHAEOLOGICAL IMPACT ASSESSMENT

Vodacom Mast McKechnie
Giyani
NORTHERN PROVINCE



Hester Roodt
November 1999



Tel: (015) 293 7075
083 293 3166
E-Mail: hr19@pixie.co.za

PO Box 1600
PIETERSBURG
0 7 0 0

CONTENTS

1	Synopsis
2	Aim Method
3	Description
6	Interpretation and Evaluation Recommendations
7	Bibliography
8	ADDENDUM 1 The Law Archaeological Impact Assessment
9	ADDENDUM 2 Extracts from the <i>National Monuments Act</i> (No 28 of 1969, as amended in 1986) that are relevant to Archaeological Sites.
10	ADDENDUM 3 Report on Workshop on <i>Standards for the Assessment of Significance and Research Priorities for Contract Archaeology</i> , SA3 (Southern African Association of Archaeologists) Biennial Conference, University of Venda, 10 July 1998

SYNOPSIS

In view of the above, it is recommended that the mast should not be erected on this site, but that another, less sensitive location be found for it.

An alternative would be the following:

- a social impact assessment done by a professionally qualified social scientist such as a socio-cultural anthropologist;
- a Phase 2 Archaeological Impact Assessment be undertaken. This would however entail detailed mapping of structures e.g terraces, grave/s(?) and middens as well as extensive excavations and analyses (e.g C¹⁴ dating, bone analysis and identification) of archaeological finds.

AIM

The aim was to undertake a Phase 1 *Archaeological Impact Assessment* of a hilltop and access route designated for the proposed Vodacom Mast Mckechnie, approximately 20 km north of Giyani, where the erection of a mast has been proposed, to assess the impact of the proposed project in terms of archaeological/historical sites and features and to make recommendations. The task was performed on November 21, 1999.

METHOD

A survey of the entire area demarcated for development was done on foot by two professional archaeologists. Archaeological features were photographed with a Kodak Digital DC120 camera.

A collection of archaeological finds were made in order to identify the cultural affiliation of the group who occupied the koppie. No test pits were dug.

DESCRIPTION

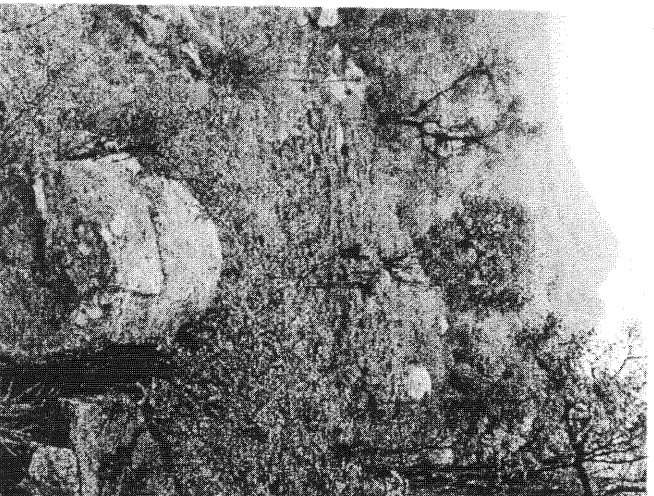
The proposed site is 20m x 20m and it, as well as the access route was clearly indicated by yellow paint on rocks. It lies on the only kopple - with a flat summit - in a rather flat area. The nearest trigonometric beacon is just south from it, on Tshivhulana, which is 653m above sea-level.

At present the area is being utilized by the local people as grazing for their cattle.

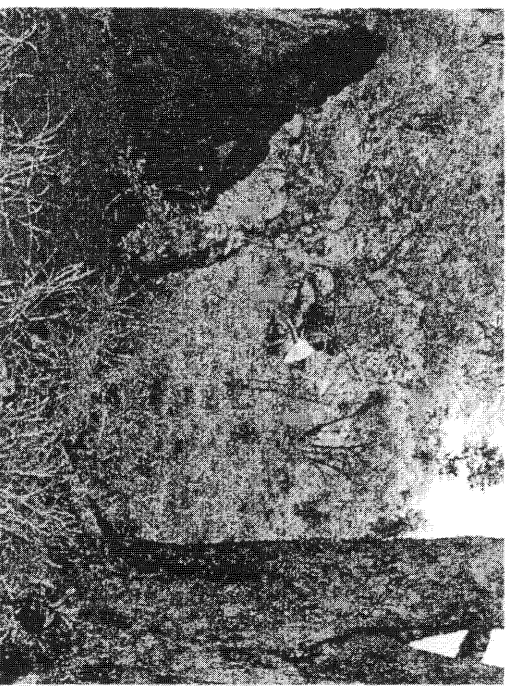


Already en route, from the bottom all the way up the slopes, pottery sherds as well as several man-made terraces were noticed. On top, the first area to be reconnoitred was the proposed location of the mast. This area, as well as the rest of the un-eroded part of the summit, rendered some pottery sherds as well as some iron slag and tuyère pieces (clay pipes that are inserted into the furnace or forge through which air is forced with bellows). As this part was little affected by erosion, one can expect to find undisturbed archaeological deposits in this area. However, upon investigation of the eroded parts on the edges of the summit, it was found to be literally covered in diagnostic (decorated and lipped) pottery sherds, and more concentrations of iron slag as well as tuyère pieces. This pattern was followed right around the entire summit.

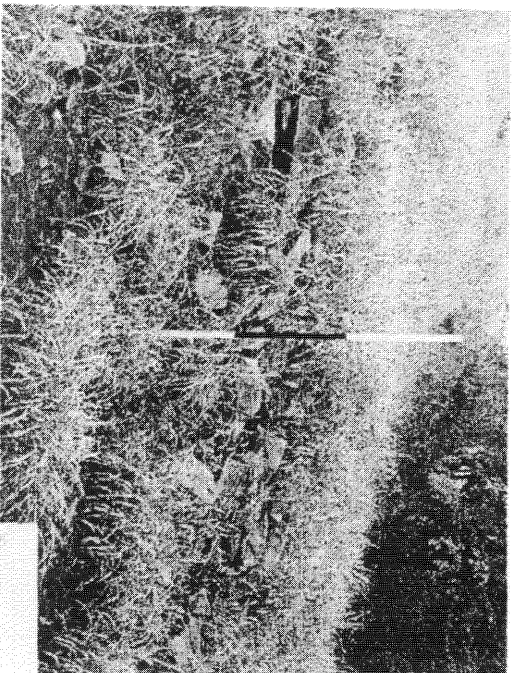
The southwestern slope. The arrows indicate the retaining stone walls of the terrace.



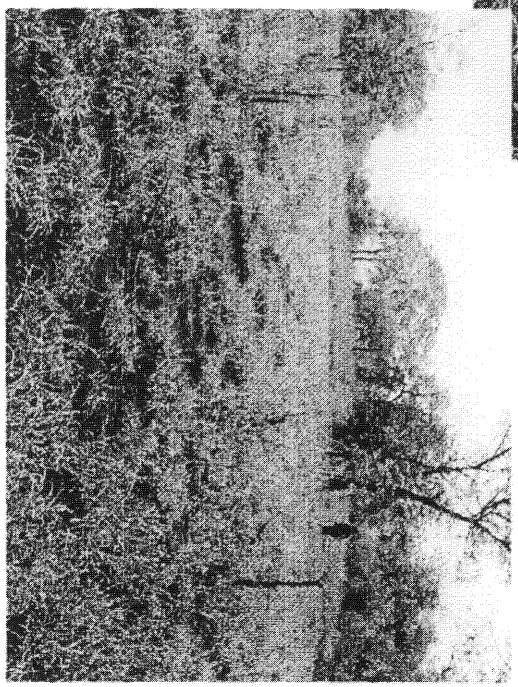
View onto a terrace on the south side, with another's retaining walls indicated by the arrows. On this lower terrace the remains of a hut floor was discovered.



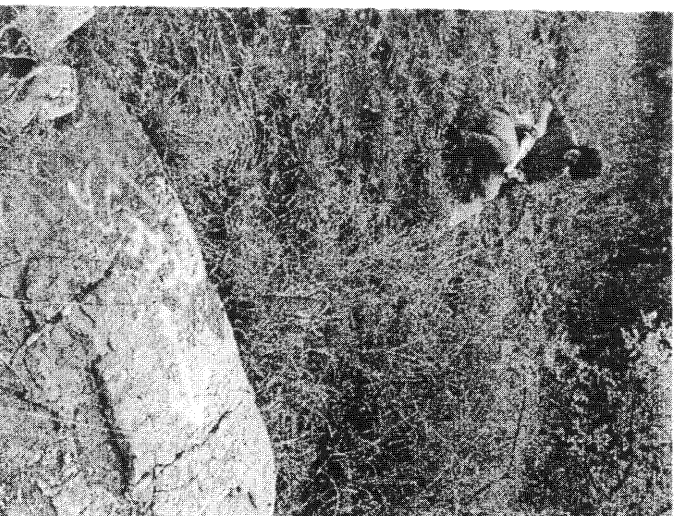
Another terrace on the southern terrace. Retaining walls are indicated by the arrows.



The western terrace with the remains of a retaining wall.



Southwestern view on the summit. Clearly little erosion has taken place. Archaeological finds will be relatively undisturbed in this context.

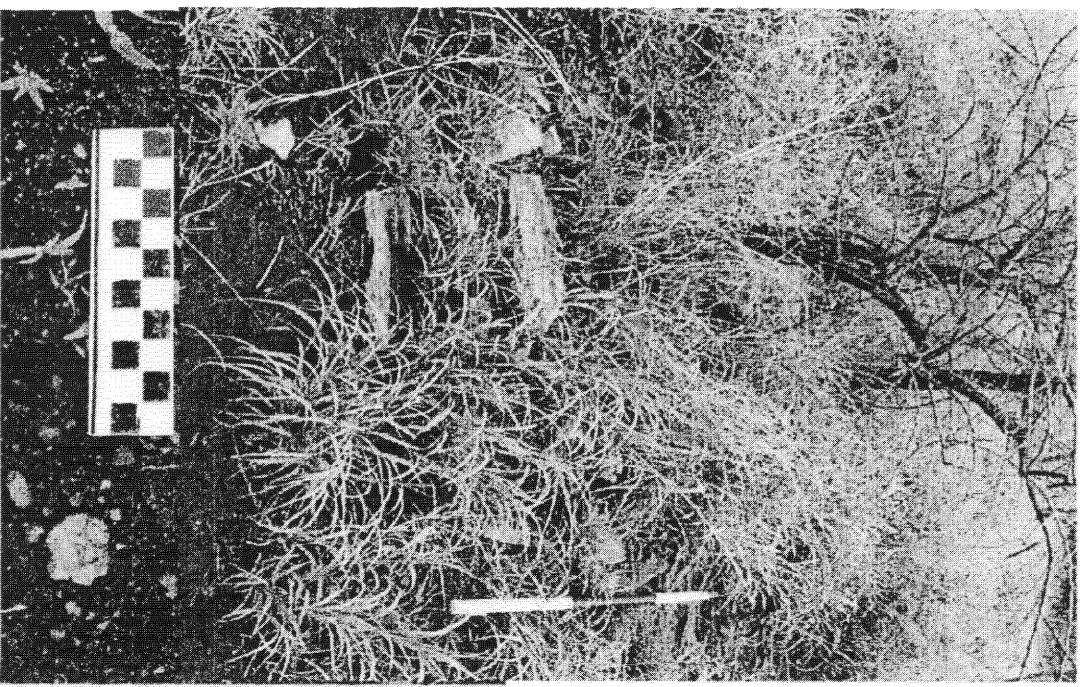


Iron slag and some tuyère pieces were collected only a few metres from the planned access route.



A large concentration of iron slag and tuyère pieces were discovered in the neck.

Another important feature on the summit is a cairn, which lies approximately in the centre. This could be a grave. At this stage it is not possible to positively identify it as such. Only excavations will reveal its true status.



INTERPRETATION & EVALUATION

The site clearly dates to the pre-colonial period as can be deduced from the extensive metal working activities on the terrain, as well as the presence of spindle whorls. The choice of the site for settlement, i.e hilltop, stone walls and terracing, indicates an early Venda occupation. The ceramic type belongs to the Letaba tradition or style, known to have been made by Venda people from the mid 16th century. The settlement pattern follows that of a prominent chief, who with his wives, would have lived on top of the hill, while the terraces, base and surrounding areas of the hill would have been occupied by people with declining status. It can be expected that graves of the ruling lineage will be located on top of the hill.

The metalworking remains are probably that of a forging process rather than that of smelting, and furthermore would probably have been in a metal such as copper and even gold that would have been associated with the east coast trade. This is also indicative of the status of the site.

Oral history clearly indicates that the Venda occupied the region in more remote times, although it is now generally a Tsonga speaking area. No archaeological research has to date been done in this area, with the result that little is known of the chronology or cultural identity of the original occupants.

It is our opinion that this unique site will yield important scientific and cultural data in respect of early Venda heritage, trade goods and trade routes. This is a **significant heritage resource** that is protected by law, and it may not be destroyed, damaged or altered in any way without a permit issued by the National Monuments Council in terms of the Act (28 of 1969).

RECOMMENDATIONS

In view of the above, it is recommended that the mast should not be erected on this particular site, but that another, **less sensitive location** be found.

An alternative would be the following:

- a Phase 2 Archaeological Impact Assessment be undertaken. This would however entail detailed mapping of structures e.g terraces, graves and middens as well as extensive excavations and analyses (e.g C¹⁴ dating, bone analysis and identification) of archaeological finds;
- a social impact assessment done by a professionally qualified social scientist such as a socio-cultural anthropologist, as this site would probably today still have socio-religious significance.

With regard to the possible grave, please refer to Addendum 2: NATIONAL MONUMENTS ACT (NO 28 OF 1969, AS AMENDED IN 1986) 12(2A) (e); as well as Addendum 3 under the heading Iron Age/Agriculturalist. With respect to middens, stone walls and other archaeological finds, the same addenda are applicable. The most relevant text has been emboldened.

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THE LAW

The National Monuments Act (No. 28 of 1969) protects all palaeontological, archaeological and historical sites and material older than 50 years. It is an offence to destroy, damage, alter, remove from its original site, or excavate any such site or material without a permit from the National Monuments Council. A person convicted of an offence in terms of the Act, could be liable for a fine of up to R10000 or two years imprisonment, or both. See *Addendum 1 for extracts from this act*.

In terms of the Environmental Conservation Act (No. 73 of 1989) the Integrated Environmental Management Procedure, Guideline Document 1 identifies certain man-made areas and features that are listed as environments which must be included in an environmental impact assessment report. These include archaeological and palaeontological sites, graves and burial sites, buildings and sites of religious, social and cultural significance.

ARCHAEOLOGICAL IMPACT ASSESSMENT

To minimise the impact of development on archaeological sites, and the impact of archaeological sites on development projects, and to avoid costly delays if a site is discovered during the course of construction work, it is important to hire an archaeologist well in advance to survey the area. It is important that developers realise that only qualified professional archaeologists should be employed to undertake survey work.

The developer is responsible for the costs involved in hiring an archaeologist to investigate the site.

Phase 1

The archaeologist hired to do the work will submit a phase 1 report. On the basis of the recommendations and assessment of significance made in the report, a decision can be taken on how the development may proceed. In most cases development will be able to go ahead as planned after the sites have been recorded.

Phase 2

In some cases, mitigation in a Phase 2 programme will be necessary and may involve excavation or collection of archaeological material. The purpose behind mitigation is to sample the site so that the evidence can be stored permanently in a museum where it can be consulted at a later date for record and research purposes.

Phase 3

More rarely, the site may be so important that it will warrant modification of the development in a Phase 3 programme. If this happens, the archaeologist, the National Monuments Council and the developer can confer on the action to be taken. It may be possible to incorporate an Iron Age village into a green belt in a housing scheme, or to modify a high rise building plan by covering rare 18th century foundations and associated rubbish dumps beneath a parking lot to avoid destroying them completely. Such solutions are possible if the archaeologist is consulted early enough in the planning process.

Permission for the development to proceed can be given only once the National Monuments Council is satisfied that steps have been taken to ensure that the archaeological sites will not be damaged, or that they have been adequately recorded and sampled.

If this chain of action is followed, we stand a chance of saving something of our archaeological heritage for future generations and of avoiding conflict between developers and cultural conservationists. The National Monuments Council must ensure that the historical and cultural heritage of all South Africans is protected. Careful planning can minimise the impact of archaeological surveys on development projects by selecting options that cause the least amount of inconvenience and delay.

ADDENDUM 2

EXTRACTS FROM THE NATIONAL MONUMENTS ACT (NO 28 OF 1969, AS AMENDED IN 1986) THAT ARE RELEVANT TO ARCHAEOLOGICAL SITES

- 12(2A) No person shall destroy, damage, excavate, alter, remove from its original site or export from the Republic -
- (a) any meteorite or fossil; or
 - (b) any drawing or painting on stone or a petroglyph known or commonly believed to have been executed by Bushmen; or
 - (c) any drawing or painting on stone or a petroglyph known or commonly believed to have been executed by any other people who inhabited or visited the Republic before the settlement of the Europeans at the Cape; or
 - (d) any implement, ornament or structure known or commonly believed to have been made, used or erected by people referred to in paragraphs (b) and (c); or
 - (e) the anthropological or archaeological contents of GRAVES, caves, rock shelters, MIDDENS, shell mounds or other sites used by such people; or
 - (f) any other **historical site***, archaeological or palaeontological finds, material or object,

except under the authority of and in accordance with a permit issued under this section.

[* An "historical site" is defined as "any identifiable building or part thereof, marker, milestone, gravestone, landmark or tell older than 50 years."]

ADDENDUM 3

Report on Workshop on Standards for the Assessment of Significance and Research Priorities for Contract Archaeology

SA3 (Southern African Association of Archaeologists) Biennial Conference
University of Venda, 10 July 1998

Janette Deacon
National Monuments Council

Opportunities for archaeological contract work will expand in southern Africa in the next few years. To make the best of the opportunities, medium-term (3-5 year) research and heritage conservation priorities need to be established as a matter of urgency in consultation with CRM practitioners, provincial and national heritage agencies and research archaeologists. The following factors are relevant.

1. In South Africa, the Department of Environmental Affairs and Tourism published on 5 September 1997 its long-awaited List of Activities which may have a substantial detrimental effect on the environment and the regulations regarding activities identified under Section 21(1) of the Environment Conservation Act (No. 73 of 1989). These effectively make environmental impact assessments compulsory for the listed activities.
2. The National Heritage Bill, designed to replace the National Monuments Act in South Africa, came before the Cabinet and Parliament in 1998. It could become law from 1 April 1999. Amongst other innovations, it makes impact assessments compulsory where historical, archaeological and palaeontological sites are affected by development but are not protected by other legislation.
3. In neighbouring African countries, the tempo of contract work is also rising as new legislation and requirements of the World Bank are implemented.

It seems widely accepted that CRM practitioners do mitigation to rescue the research potential of a site which would otherwise be lost. The following kinds of sites were identified as being worthy of mitigation:

Stone Age / Hunter Gatherer

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| <ul style="list-style-type: none">• any open air site with bone or other organic material;• any cave or rock shelter with deposit;• rock paintings and rock engravings (record context as well as images);• quarry sites with possibilities for core re-fitting;• long sequence sites;• coastal and inland shell middens;• any sites with Howiesons Poort, Stillbay or Robberg artefacts;• human remains or burials;• fish traps;• placement of Earlier Stone Age sites in the land- | <ul style="list-style-type: none">• scape - are they associated with river valleys, water sources or quarries?• evidence for modernity in Middle Stone Age sites;• sites with evidence for interaction between Stone Age and Iron Age or colonial people;• Later Stone Age sites with Bambata pottery;• pastoral sites, especially in the Eastern Cape;• caches of ostrich eggshells or other items;• hunting blinds;• evidence for exploitation of raw material sources such as haematite or specularite. |
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Iron Age / Agriculturist

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| <ul style="list-style-type: none"> • Sites that will help to clarify the ceramic sequence of the Early Iron Age in the northern and eastern regions of southern Africa; • any Bambata settlement; • Early Iron Age sites with evidence for structures or long term occupation; • sites with evidence for political or social hierarchies; • evidence of the organization of metal production; • burials with evidence for social differentiation, health and nutrition; • evidence for trade within and outside of the Zimbabwe culture area; • sites in areas that are under-researched to build up the culture-historical sequence; • special-purpose sites such as rainmaking, circumcison, mining, furnaces, cattle posts vs living sites, salt making; • Blackburn and Moor Park sites in KwaZulu-Natal; • well preserved early Moloko sites with middens for evidence of diet and subsistence or stone | <ul style="list-style-type: none"> • walling; • any Zimbabwe-style stone walling should be mapped in sufficient detail to estimate factors such as population size and grain-bin variability; • evidence for contemporary cultural interaction, for example between Khami and Moloko; • sites with architectural styles and information on materials used for housing, even in the recent past; • evidence for the introduction of maize, either direct or in the style of grindstones used; • sites with botanical remains of cultigens; • information on the distribution, size and characteristics of dolly-holes for gold mining; • evidence for textiles or weaving in addition to spindle whorls; • evidence for games and contextual information relating to them; • figurine caches and spatial relationships to settlements; • check stone outcrops near stonewalled sites for engravings. |
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Historical / Colonial

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| <ul style="list-style-type: none"> • sites connected with whaling and sealing; • ships or ship/boat structures on land; • shipwreck survivor camps; • sites in the interior with nineteenth century ceramics (RESUNACT is preparing guidelines for identification); • single occupation sites in urban environments with deposits such as wells, cisterns and depresions; • 17th century or early 18th century sites in Cape Town; • sites that are connected with national and international slave trade routes; • LSA sites with metal items such as brass buttons; | <ul style="list-style-type: none"> • documentary and archival searches should be done before going into the field; • sites that could inform on the effects of military forces on indigenous local populations; • the symbolic significance of textiles, beads and other items imported by traders; • sites with oral traditions of sacred significance - oral histories increase significance and are therefore relevant to archaeology; • historical graves need sensitive removal during mitigation and this is often best done in collaboration between archaeologists and funeral specialists. |
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